STATEMENT OF BASIS FOR IMPLEMENTING CORRECTIVE ACTION

FORMER ASHLAND DISTRIBUTION SERVICES ORGANIZATION (DSO)
GREENVILLE, GREENVILLE COUNTY, SOUTH CAROINA
SCD 062 697 735

PURPOSE OF THE STATEMENT OF BASIS

This Statement of Basis has been prepared to inform the public and provide an opportunity to comment on the proposed corrective action for areas of concern (AOCs) at the Former Ashland DSO Site (Ashland). The Ashland Site is located at 100 Industrial (Bi-Lo) Blvd, Greenville, South Carolina 29607 having the facility identification number SCD 062 697 735.

The October 29, 2010 Corrective Measures Study (CMS) Report proposes corrective action for source zone soils and the off-site dissolved groundwater impacts from AOC A (Sandy Backfill Product Piping Trench) at the Former Ashland DSO facility. The SOB should not be considered the primary source of information for this site. The SOB summarizes information that can be found in greater detail in the following Resource Conservation and Recovery Act (RCRA) Facility Investigation (RFI) documents:

- *Phase I RFI Status Report (Environmental Strategies Corp., December 1989)*
- *RFI Summary Report (Environmental Strategies Corp., January 1990)*
- *RFI Activities Summary Letter and Quarterly Summary Report, Supplemental RFI Phase II (Environmental Strategies Corp., January 1999)*
- *RCRA Facility Investigation Report (Phase III) (Environmental Strategies Corp., October 1999)*
- *RCRA Facility Investigation Report (Environmental Strategies Corp., February 2001)*
- *Submittal of Membrane Interface Probe Data (Initial Phase V RFI Report) (URS, December 2003)*
- *RCRA Phase V Report (Direct Push Study Report Revised) (URS, June 2005)*
- *March 2007 Phase VI RFI Status Report (URS, April 2007)*
- *August 2007 Phase VI RFI Status Report (URS, September 2007)*
- *RFI Status Report, September to December 2007 (ARCADIS, March 2008)*
- *February 2008 Investigation Summary (ARCADIS, May 2008)*
- *Site Progress Report, April 2008 Soil Gas, Surface Water and Sediment Investigation (ARCADIS, July 2008)*
- *RFI Status Report, July to October 2008 (ARCADIS, February 2009)*
- *RFI Site Assessment Report (Stone Environmental, November 2009)*
- *Comprehensive RFI Report (ARCADIS, April 2010)*
- *Corrective Measures Study Report (ARCADIS October 2010)*

The South Carolina Department of Health and Environmental Control (SCDHEC) has determined that the proposed corrective action should be sufficient to protect human health and the environment. However, prior to final approval of the proposed corrective action, the public has an opportunity to comment on the proposed corrective action. At any time during the public comment period, the public may comment as described in the "How Do You Participate?" section. Upon closure of the public comment period, SCDHEC will evaluate all comments and questions and determine if there is a need to modify the proposed corrective action.

HOW DO YOU PARTICIPATE?

The SCDHEC solicits public review and comment prior to approval of the proposed corrective action for AOC A. The public comment period for the proposed corrective action will begin on August 15, 2011 and will end 45 days later on September 29, 2011.

The Statement of Basis and the documents associated with the investigations and corrective actions proposed for the site will be available to the public for review during regular business hours, Monday through Friday, except legal holidays at the following locations:

Mauldin Library
800 West Butler Rd
Greenville, SC 29607

SCDHEC Region 2 EQC Office
301 University Ridge, Suite 5800
Greenville, SC 29601

SC DHEC
Bureau of Land and Waste Management
8911 Farrow Road
Columbia, South Carolina 29203

Any comments on the proposed corrective action and/or requests for a public hearing should be sent to:

Richard Haynes, P.E. Director
Division of Waste Management
South Carolina Department of Health and Environmental Control
2600 Bull Street
Columbia, South Carolina 29201
Phone: (803) 896-4070

Email: haynesra@dhec.sc.gov

To be considered, all requests and/or comments must be received in writing no later than September 29, 2011, at which time the forty-five (45) day public comment period will end.

FACILITY DESCRIPTION

The Former Ashland DSO facility is located at 100 Bi-Lo Boulevard in Greenville, Greenville County, South Carolina and encompasses approximately 5 acres in an area where land use is dominated by industrial and commercial facilities. The population of the city of Greenville is estimated at 57,000. The facility operated from late 1967 until mid 2002. The facility consisted of a 30,000 square foot warehouse and office building, a drumming shed, a tanker truck loading and unloading building, above ground storage tanks (ASTs), a hazardous waste storage area, a neutralization tank, and two underground storage tanks (USTs) used for waste spill tanks. Former operations at the facility included distribution of both chlorinated and non-chlorinated solvents, organic and inorganic chemicals, lubricants, plastics, fiberglass, and food grade products.

In March of 2004, Ashland sold the property to Bradco Realty Corporation [Bradco Supply Corporation (Bradco)]. On July 1, 2010, Bradco was purchased by ABC Supply Company, Incorporated (ABC), who

has operations similar to Bradco. Bradco currently operates the site for the storage and distribution of inert building materials, namely roofing and siding supplies, and windows.

SITE HISTORY

The facility utilized 22 ASTs for the storage of bulk products in both liquid and dry form. The ASTs were connected to the former drumming operations area and the truck loading area via underground product lines. Following the operations shutdown in April 2002, soil was excavated from two small areas near the underground piping, one was along the footer of the drumming operations shed and the other was along the wall of the AST secondary containment. Impacted soil was observed in both excavations. The area where the product lines connected the former drumming area and the truck loading area is identified as AOC A, or the Sandy Backfill Product Piping Trench. The results of the RFI activities concluded that while a specific point source could not be identified, the majority of source mass is found in AOC A.

During the investigations, several interim measures have been completed at the Ashland facility since 1999 to remove impacted soil and groundwater. These interim measures include:

- On January 30, 2002, a Vacuum Enhanced Recovery event was conducted at the site to remove light non-aqueous phase liquid (LNAPL) in several groundwater monitoring wells.
- In August 2004, demolition activities were initiated to remove the former AST concrete containment pad (former tank farm).
- Following removal of the concrete containment pad, all visually impacted soil in the area of the former containment pad was removed.
- In August 2006, a recovery system was installed to remove LNAPL from groundwater.
- Routine manual dense non-aqueous phase liquid (DNAPL) recovery was initiated in December 2008, to address recoverable quantities of DNAPL present in site groundwater monitoring wells.

In general, these interim measures have successfully removed mass and controlled the migration of DNAPL and LNAPL impacts and mitigated potential site-related risks.

SITE RISK

Historical media sampling events included soil (surface and subsurface), groundwater, surface water, sediment, and soil gas. Evaluations of laboratory analytical data revealed elevated levels of contamination in soil, groundwater, surface water and soil gas above state and federal screening levels. However, based on current conditions and the institutional and management controls already in place at the site, the exposure pathways are either incomplete and/or the concentrations detected do not pose unacceptable risks to human health and the environment.

On the basis of the South Carolina Regulation R.61-68 (SCDHEC, 2008), the established media cleanup objectives for groundwater and surface water will include the applicable state regulations. These cleanup objectives for groundwater are the maximum contaminant levels (MCLs) established by the United States Environmental Protection Agency (USEPA) (USEPA, 2009). If a constituent is detected at the site where a MCL has not been established, the regional screening level (RSL) will be used (USEPA, 2010). The surface water goals will include the criteria outlined in R.61-68 (Appendix: Water Quality Numeric Criteria for the Protection of Aquatic Life and Human Health, SCDHEC, 2008).

PROPOSED CORRECTIVE ACTION FOR SOLID WASTE MANAGEMENT UNITs

Based on the results of the RCRA Facility Investigation (RFI), the Corrective Measures Report (CMS) proposes corrective measures for AOC A at the site. The overall objective of the site-wide remedy is to eliminate off-site exposure through the implementation and operation of appropriate remedial technologies. Remedies will target mass removal in order to lower the migration potential of contaminants in the subsurface. Short-term enhancements may be implemented in order to reduce the duration of the remedies.

The source of contaminants in the soil and groundwater are located in the vicinity of AOC A. The selected remedial alternative will be designed to target both soil and groundwater impacts related to AOC A. The following potential remedial technologies were evaluated to address the soil and groundwater impacts associated with the historic operations at the Former Ashland DSO facility:

- *Excavation/In-Situ Soil mixing*
- *In-Situ Thermal*
- *Flushing and Enhanced Bioremediation*
- *Groundwater Extraction*
- *Enhanced Reductive Dechlorination*
- *In-Situ Chemical Oxidation*
- *Monitored Natural Attenuation*

SCOPE OF CORRECTIVE ACTION

Remedial alternatives were evaluated for both the source zone soils and the off-site, dissolved groundwater impacts. The initial screening of the remedial alternatives was completed using qualitative remedial screening criteria. Based on this initial evaluation, remedial alternatives retained were further evaluated using a groundwater fate and transport model to quantify the effectiveness of each remedial scenario. On the basis of this evaluation, the following combination of remedial alternatives was selected:

- Flushing and enhanced bioremediation with the source areas to optimize mass removal;
- Groundwater extraction and treatment to provide hydraulic containment of the source zone and control of the off-site groundwater plume;
- Monitored natural attenuation of the dilute fringes of the groundwater plume and residual impacts once active remediation is completed off site;
- Manual NAPL recovery; and
- Land use controls.

As a part of the scope of the corrective action, a NPDES permit will also be public noticed.

PUBLIC PARTICIPATION

To facilitate public participation in the corrective action process at the Site, the following actions have been taken:

- Established a local information repository

- Developed this Statement of Basis

- Prepared a mailing list and mailed this Statement of Basis and Public Notice to the facility mailing list

NEXT STEPS

Following consideration of public comments by SC DHEC, a revised Final Decision and Response to Comments (FDRTC) accepting or rejecting the proposed corrective action will be issued.